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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/987,643	11/15/2001	Roy E. Seibert	PRO0001-US	7439

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EXAMINER

OUELLETTE, JONATHAN P

ART UNIT	PAPER NUMBER
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3629

DATE MAILED: 07/21/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/987,643

Applicant(s)

SEIBERT, ROY E.

Examiner

Jonathan Ouellette

Art Unit

3629

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 May 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-12, 15-18 and 20-23 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-12, 15-18 and 20-23 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.

- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152).
- 6) ☐ Other: _____.

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DETAILED ACTION

Response to Amendment

1. Claims 13, 14, and 19 have been cancelled and Claims 21-23 have been added; therefore, Claims 1-12, 15-18, and 20-23 are currently pending in application 09/987,643.

Claim Rejections - 35 USC § 101

2. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. **Claims 8-10 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.**

The basis of this rejection is set forth in a two-prong test of:

- (1) whether the invention is within the technological arts; and
- (2) whether the invention produces a useful, concrete, and tangible result.

4. As an initial matter, the United States Constitution under Art. I, §8, cl. 8 gave Congress the power to "[p]romote the progress of science and useful arts, by securing for limited times to authors and inventors the exclusive right to their respective writings and discoveries". In carrying out this power, Congress authorized under 35 U.S.C. §101 a grant of a patent to "[w]hoever invents or discovers any new and useful process, machine, manufacture, or composition or matter, or any new and useful improvement thereof." Therefore, a fundamental premise is that a patent is a statutorily created vehicle for

Congress to confer an exclusive right to the inventors for "inventions" that promote the progress of "science and the useful arts". The phrase "technological arts" has been created and used by the courts to offer another view of the term "useful arts". See *In re Musgrave*, 167 USPQ (BNA) 280 (CCPA 1970). Hence, the first test of whether an invention is eligible for a patent is to determine if the invention is within the "technological arts".

5. Further, despite the express language of §101, several judicially created exceptions have been established to exclude certain subject matter as being patentable subject matter covered by §101. These exceptions include "laws of nature", "natural phenomena", and "abstract ideas". See *Diamond v. Diehr*, 450, U.S. 175, 185, 209 USPQ (BNA) 1, 7 (1981). However, courts have found that even if an invention incorporates abstract ideas, such as mathematical algorithms, the invention may nevertheless be statutory subject matter if the invention as a whole produces a "useful, concrete and tangible result." See *State Street Bank & Trust Co. v. Signature Financial Group, Inc.* 149 F.3d 1368, 1973, 47 USPQ2d (BNA) 1596 (Fed. Cir. 1998).
6. This "two prong" test was evident when the Court of Customs and Patent Appeals (CCPA) decided an appeal from the Board of Patent Appeals and Interferences (BPAI). See *In re Toma*, 197 USPQ (BNA) 852 (CCPA 1978). In *Toma*, the court held that the recited mathematical algorithm did not render the claim as a whole non-statutory using the Freeman-Walter-Abele test as applied to *Gottschalk v. Benson*, 409 U.S. 63, 175 USPQ (BNA) 673 (1972). Additionally, the court decided separately on the issue of the "technological arts". The court developed a "technological arts" analysis:

The "technological" or "useful" arts inquiry must focus on whether the claimed subject matter...is statutory, not on whether the product of the claimed subject matter...is statutory, not on whether the prior art which the claimed subject matter purports to replace...is statutory, and not on whether the claimed subject matter is presently perceived to be an improvement over the prior art, e.g., whether it "enhances" the operation of a machine. *In re Toma* at 857.

7. In *Toma*, the claimed invention was a computer program for translating a source human language (e.g., Russian) into a target human language (e.g., English). The court found that the claimed computer implemented process was within the "technological art" because the claimed invention was an operation being performed by a computer within a computer.
8. The decision in *State Street Bank & Trust Co. v. Signature Financial Group, Inc.* never addressed this prong of the test. In *State Street Bank & Trust Co.*, the court found that the "mathematical exception" using the Freeman-Walter-Abele test has little, if any, application to determining the presence of statutory subject matter but rather, statutory subject matter should be based on whether the operation produces a "useful, concrete and tangible result". See *State Street Bank & Trust Co.* at 1374. Furthermore, the court found that there was no "business method exception" since the court decisions that purported to create such exceptions were based on novelty or lack of enablement issues and not on statutory grounds. Therefore, the court held that "[w]hether the patent's claims are too broad to be patentable is not to be judged under §101, but rather under §§102, 103 and 112." See *State Street Bank & Trust Co.* at 1377. Both of these analysis goes towards whether the claimed invention is non-statutory because of the presence of an abstract idea. Indeed, *State Street* abolished the Freeman-Walter-Abele test used in *Toma*.

However, *State Street* never addressed the second part of the analysis, i.e., the "technological arts" test established in *Toma* because the invention in *State Street* (i.e., a computerized system for determining the year-end income, expense, and capital gain or loss for the portfolio) was already determined to be within the technological arts under the *Toma* test. This dichotomy has been recently acknowledged by the Board of Patent Appeals and Interferences (BPAI) in affirming a §101 rejection finding the claimed invention to be non-statutory. See *Ex parte Bowman*, 61 USPQ2d (BNA) 1669 (BdPatApp&Int 2001).

9. Claims 8-10 appear to be describing a method provides reminders to users, wherein the user contacts the service and requests a reminder for service. Thus, this process does not include a distinguishable apparatus, computer implementation, or any other incorporated technology, and would appear to be an attempt to patent an abstract idea not a "tangible" process and, therefore, non-statutory subject matter.
10. As to technological arts recited in the preamble, mere recitation in the preamble (i.e., intended or field of use) or mere implication of employing a machine or article of manufacture to perform some or all of the recited steps does not confer statutory subject matter to an otherwise abstract idea unless there is positive recitation in the claim as a whole to breathe life and meaning into the preamble.
11. Mere intended or nominal use of a component (receiving information through a computer network – equivalent to looking information up on the Internet), albeit within the technological arts, does not confer statutory subject matter to an otherwise abstract idea if

*the component does not apply, involve, use, or advance the underlying process
(automated manipulation of data).*

Claim Rejections - 35 USC § 112

12. The rejection of Claims 11-14 and 17-19 under 35 U.S.C. 112, is withdrawn due to applicant's amendment.

Claim Rejections - 35 USC § 103

13. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

14. **Claims 1, 2, 4-12, 15-18, and 20-23** are rejected under 35 U.S.C. 103(a) as being unpatentable over Hughes (Hughes, Arthur Middleton, "Friendly reminder: 3M is boosting sales – and promoting clean air – with a retention program for its Filtrete filters." Direct, v9, n11, p39(2), September 1, 1997) in view of Dustless.com (www.dustless.com, Retrieved from Internet Archive Wayback Machine <www.archive.org>, Date: 8/23/1999).
15. As per **independent Claim 1**, Hughes discloses a system for notifying customers comprising: means for receiving filter information from a customer (user registration), wherein the filter information includes at least one of a filter system brand, a model

number, a filter replacement part number, location of the filter system, and *desired changing cycles* (sticker indicating month they wish to change their filter); means for computing a filter replacement date at least based on the received filter information (one week before customers change date); and means for scheduling a service to change a replacement filter on the filter replacement data (reminder letter to consumer scheduling consumer change of filter) (Hughes, Arthur Middleton, "Friendly reminder: 3M is boosting sales – and promoting clean air – with a retention program for its Filtrete filters." Direct, v9, n11, p39(2), September 1, 1997).

16. Hughes fails to expressly disclose wherein the registration takes place over a computer network.
17. Dustless.com disclosed registering for a filter change reminder serve over the Internet (Computer Network).
18. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have included registering for the notification system over a computer network, as disclosed by Dustless.com in the system disclosed by Hughes, for the advantage of providing a notification system, with the ability to increase system effectiveness/efficiency by exchanging registration and notification information with users over a variety of communication channels.
19. As per Claim 4, Hughes and Dustless.com disclose wherein previous interactions with the customer are stored as historical information (Hughes: marketing database).
20. As per Claim 5, Hughes and Dustless.com disclose wherein historical information is considered in computing the filter replacement date (Hughes: reminder database).

21. As per Claim 6, Hughes and Dustless.com disclose wherein the first filter replacement date and the second filter replacement date define a first filter replacement interval and wherein a third filter replacement date and a forth replacement date define a second filter replacement interval, and wherein the first replacement interval is different from the second replacement interval (operational consistency– has no impact on system service).
22. As per Claim 7, Hughes and Dustless.com disclose wherein the second filter replacement date is the same as the third replacement date.
23. As per Claims 21, Hughes and Dustless.com fail to expressly disclose wherein the means for scheduling a service includes scheduling a service technician dispatch to change the replacement filters.
24. However, Hughes does disclose wherein both Hughes and Dustless.com remind the customer that it is time to change the filter, and it would have been obvious to one of ordinary skill in the art to schedule a professional to complete maintenance on a HVAC unit instead of the customer completing the filter change themselves.
25. As per Claims 22, Hughes and Dustless.com fail to expressly disclose wherein the means for scheduling a service including commanding a fulfillment location to ship the replacement filter to the customer.
26. However, Hughes does disclose sending a reminder to the customer when it's time to change their filter and including rebates along with the reminder, and it would have been obvious to one of ordinary skill in the art at the time the invention was made for the reminding agency to send the customer the entire filter, to save the customer travel time to the local hardware store.

27. As per Claims 23, Hughes and Dustless.com disclose means for sending a contact to a customer on a message date that is related to the filter replacement date.
28. As per Claim 2, Hughes and Dustless.com disclose wherein the message date is before the filter replacement date.
29. As per **independent Claim 8**, Hughes discloses a method for notifying customer comprising the steps of: receiving, from a customer, information related to a filter (user registration), wherein the filter information includes *at least one of* a filter brand, a model number, a filter replacement part number, location of the filter system, and *desired changing cycles* (sticker indicating month they wish to change their filter); using the information to computer a replacement time for the filter (one week before customers change date); and scheduling a service to change the filter at the replacement time for the filter (reminder letter to consumer scheduling consumer change of filter) (Hughes, Arthur Middleton, "Friendly reminder: 3M is boosting sales – and promoting clean air – with a retention program for its Filtrete filters." Direct, v9, n11, p39(2), September 1, 1997).
30. Hughes fails to expressly disclose wherein the registration takes place over a computer network.
31. Dustless.com disclosed registering for a filter change reminder serve over the Internet (Computer Network).
32. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have included registering for the notification system over a computer network, as disclosed by Dustless.com in the system disclosed by Hughes, for the advantage of providing a notification system, with the ability to increase system

effectiveness/efficiency by exchanging registration and notification information with users over a variety of communication channels.

33. As per Claim 9, Hughes and Dustless.com disclose providing a contact with the customer at the replacement date, wherein the contact is information related to the filter and a reminder to replace the filter.
34. As per Claims 10, Hughes and Dustless.com fail to expressly show commanding a fulfillment location to ship a replacement filter to the customer or a service technician dispatch.
35. However, Hughes does disclose sending a reminder to the customer when it's time to change their filter and including rebates along with the reminder, and it would have been obvious to one of ordinary skill in the art at the time the invention was made for the reminding agency to send the customer the entire filter, to save the customer travel time to the local hardware store.
36. As per Claim 11, Hughes and Dustless.com disclose wherein the contact is a message the method further comprising waiting for a response after sending the message.
37. As per Claim 12, Hughes and Dustless.com disclose after receiving the information, sending a product to the customer (Hughes: rebate/coupon offers).
38. As per Claim 15, Hughes and Dustless.com disclose wherein previous interactions with the customer are stored as historical information (Hughes: marketing database).
39. As per Claim 16, Hughes and Dustless.com disclose wherein the historical information is considered in computing the filter replacement.

40. As per Claim 17, Hughes and Dustless.com disclose wherein the first filter replacement date and the second filter replacement date define a first filter replacement interval and wherein a third filter replacement date and a forth replacement date define a second filter replacement interval, and wherein the first replacement interval is different from the second replacement interval (operational consistency– has no impact on method service).
41. As per Claims 18, Hughes and Dustless.com disclose fail to expressly disclose wherein the system retains information related to customer equipment; and identifying the replacement filter based on the information (Hughes: survey records).
42. As per Claims 20, Hughes and Dustless.com fail to expressly disclose wherein the scheduling a service includes scheduling a service technician dispatch to replace the filter at the filter replacement date.
43. However, Hughes does disclose wherein both Hughes and Dustless.com remind the customer that it is time to change the filter, and it would have been obvious to one of ordinary skill in the art to schedule a professional to complete maintenance on a HVAC unit instead of the customer completing the filter change themselves.
44. **Claim 3 is rejected under 35 U.S.C. 103 as being unpatentable over Hughes.**
45. As per Claim 3, Hughes does not expressly show wherein the message date is the same as the filter date.
46. However these differences are only found in the nonfunctional descriptive material and are not functionally involved in the steps recited. The customer notification system would be performed regardless of the when the message date was. Thus, this descriptive material will not distinguish the claimed invention from the prior art in terms of

patentability, *see In re Gulack*, 703 F.2d 1381, 1385, 217 USPQ 401, 404 (Fed. Cir. 1983); *In re Lowry*, 32 F.3d 1579, 32 USPQ2d 1031 (Fed. Cir. 1994).

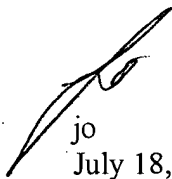
47. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have sent the message on the same date as the filter date, because such data does not functionally relate to the steps in the method claimed and because the subjective interpretation of the data does not patentably distinguish the claimed invention.

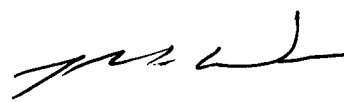
Response to Arguments

48. Applicant's arguments filed 5/3/2005, with respect to Claims 1-12, 15-18, and 20-23, have been considered but are moot in view of the new ground(s) of rejection.
49. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).
50. A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Conclusion

51. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jonathan Ouellette whose telephone number is (571) 272-6807. The examiner can normally be reached on Monday through Thursday, 8am - 5:00pm.
52. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Weiss can be reached on (571) 272-6812. The fax phone numbers for the organization where this application or proceeding is assigned (571) 273-8300 for all official communications.
53. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Office of Initial Patent Examination whose telephone number is (703) 308-1202.


jo
July 18, 2005


JOHN G. WEISS
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TECHNOLOGY CENTER 3600